

Simple Science Experiments

Self-inflating Balloon

You will need:

- Drink bottle
- Balloon
- Bicarb soda
- Funnel
- Vinegar

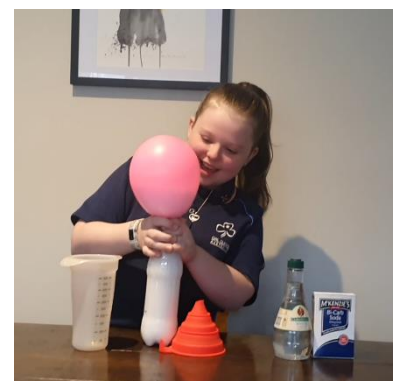
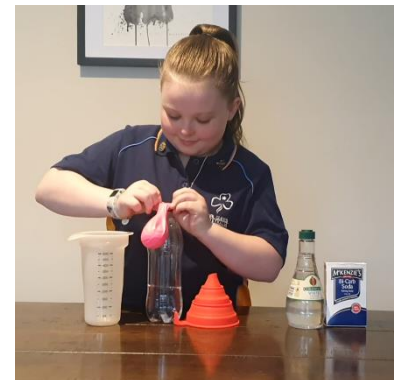
Instructions:

1. Fill a balloon with one spoonful of bicarb soda.
2. Half fill a bottle with vinegar, using the funnel to help!
3. Stretch the opening of the balloon over the neck of the bottle.
4. Empty the bicarb soda from the balloon into the bottle.
5. Observe the reaction... what do you see?

What's happening?

Vinegar and bicarb soda, when mixed, cause a chemical reaction that creates carbon dioxide – the same gas we breathe out. The gas blows up the balloon!

Take it further: What other items in your kitchen pantry bubble when you mix them together? Those bubbles are gas – see which combination blows your balloon up the fastest!



Disappearing Egg

You will need:

- Glass bottle
- Hard-boiled egg, with the shell removed
- Kettle of boiling water

Instructions:

1. Half fill a glass bottle with boiling water. ***Be careful – this will make the glass bottle very hot.***



2. Place the egg on top of the bottle.
3. Watch it disappear!



What's happening?

As the glass bottle cools down, the air pressure in the bottle drops below the pressure in the outside air (the atmosphere). This pushes the egg down into the bottle!

Take it further: *Ask an adult to help or supervise you* use a lit match inside the bottle instead of hot water. What happens?

